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Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 10/03)

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) FROM
THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed
  after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any
  earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *18 March 2004*.

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is
closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-28* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-12 and 15-28* is/are rejected.

7)☒ Claim(s) *13 and 14* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *14 February 2001* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All   b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage
application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☒ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ .

5)☐ Notice of Informal Patent Application (PTO-152)

6)☐ Other: _____.

DETAILED ACTION

Claim Objections

1. **Claim 28** is objected to because of the following informalities:

Term "**data field..**" in line 3 is improper since there are two periods at the end of word

field. Examiner suggests changing this term to "**data field.**".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the **first paragraph** of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making
> and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it
> pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode
> contemplated by the inventor of carrying out his invention.

3. **Claim 7** is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the

written description requirement. The claim(s) contains subject matter, which was not described

in the specification in such a way as to reasonably convey to one skilled in the relevant art that

the inventor(s), at the time the application was filed, had possession of the claimed invention.

In Regarding to Claim 7: Claimed subject matter of a step of the method "**and sending**

the remnant packet" in line 4 is not adequately disclosed in the specification. Herein, this

claim claimed "the method of claim 1, further comprising: when the address field of the original

data packet includes sufficient available space for subsequent routing of the original data packet

in an intermediate network, **sending the original data packet without constructing and**

sending the remnant packet." However, the specification does not support for a step of method

for sending *both* the original data packet without constructing *and* <u>the remnant packet</u>. The

specification ONLY supports for sending the original data packet without constructing, but it

does not support both: "sending the original data packet without constructing and sending the

remnant packet".

4. The following is a quotation of the **second paragraph** of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

5. **Claim 4** is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to

particularly point out and distinctly claim the subject matter which applicant regards as the

invention.

Claim 4 recites the limitations **"the first data information"** in line 3. There are

insufficient antecedent basis for these limitations in the claim.

Claim Rejections - 35 USC § 102

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the

basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

7. The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999

(AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002

do not apply when the reference is a U.S. patent resulting directly or indirectly from an

international application filed before November 29, 2000. Therefore, the prior art date of the

reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA

35 U.S.C. 102(e)).

8. **Claims 1, 8, 17, 19 and 22** are rejected under 35 U.S.C. 102(e) as being anticipated by

Woodward et al. (US Patent No. **6,151,318**), hereinafter referred to as Woodward.

a) **In Regarding to Claim 1: Woodward disclosed** a method for sending a data packet,

the method comprising:

receiving an original data packet characterized by a fixed-length packet format defining

an address field and a data field, the original data packet carrying original data packet routing

information in the address field and original data packet data information in the data field *(see*

step 610 in Fig.6; wherein an ATM cell has a header field and a payload field, hence address

field and data field);

constructing a remnant packet characterized by the fixed-length packet format including a

remnant packet data field and a remnant packet address field *(see steps 620 and 650 in Fig.6; see*

Fig.1: 30 (remnant packet), blocks 32 and 34 (address field), and block 36 (data field); col.2 line

52-col.3 line 6: Data packet 30, in a preferred embodiment, payload 36 is exactly 106 bytes long

(hence, it is inherently the packet of Woodward can be fixed-length packet)) by inserting at least

a portion of the original packet routing information in the remnant packet data field *(see Fig.2:*

according to this figure, it shows a portion of header 122 of the ATM cell 120 (the original fixed-

length packet) has been inserted into the payload 146 (data field) of the packet 140 (remnant

packet)); and

sending the remnant packet *(see Fig.4: 450)*.

b) **In Regarding to Claim 8: Woodward further disclosed** the method of claim 1,

further comprising setting a remnant packet flag in the remnant packet *(see col.5 lines12-15)*.

c) **In Regarding to Claim 17: Woodward disclosed** a communication network node

comprising:

a receiver for receiving an original data packet characterized by a fixed-length packet

format defining an original address field and an original data field *(see Fig.4: block 410)*; and

a processor coupled to said receiver and operable to construct a remnant packet according

to the fixed-length packet format including a remnant address field and a remnant data field, by

moving at least a portion of the original address field into the remnant data field *(see Fig.4:block*

438 and col.6 line 42-col.7 line 59; and see Fig.2: a portion of header 122 of ATM cell 120 has

been moved to the payload 146 of the packet 140).

d) **In Regarding to Claim 19: Woodward further disclosed** the communication

network node of claim 17, wherein the remnant data field comprises at least a portion of a prior

original data packet *(see Fig.1: packet 30 (remnant packet) and packet 20 (a prior original*

packet).

e) **In Regarding to Claim 22: Woodward further disclosed** the communication

network node of claim 17, wherein the remnant packet comprises a remnant packet flag *(see*

col.5 lines12-15).

Claim Rejections - 35 USC § 103

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness

rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

10. **Claim 6, 9, 16, 23-26** and **28** are rejected under 35 U.S.C. 103(a) as being unpatentable over

Woodward (US Patent No. **6,151,318**).

a) **In Regarding to Claim 6: Woodward disclosed** all aspects of this claim as set forth in the claim 1, and Woodward further disclosed the method, wherein: receiving an original data packet comprises receiving an original ATM cell including a VCI *(see Fig.6 step 610: ATM cells, hence including VCI)*

Woodward failed to explicitly disclose constructing a remnant packet further comprises inserting the VCI from the original ATM cell in the data field of the remnant packet. However, accordingly in Fig.2, there is a portion of header 122 of the ATM packet 120 *(the original ATM packet)* is inserted in the data field of the packet 140 *(remnant packet);* it is possible that this inserted portion can be a VCI because the VCI a component of an ATM header.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such inserting the VCI from the original ATM cell in the data field of the remnant packet teaching in the instant claim with Woodward, in order to identify one of logical connections multiplexed on one logical path that is communicated between switching stations. The motivation for doing so would have been to route data information through a communications network more efficient and reliable. Therefore, it would have been obvious to combine the instant claim and Woodward the invention as specified in this claim.

b) **In Regarding to Claim 9: Woodward disclosed** a method for receiving a data packet comprising:

receiving a current remnant packet characterized by a fixed-length packet format defining

an address field and a data field *(see step 610 in Fig.6)*, the current remnant packet carrying

remnant routing information in the address field and remnant data information in the data field

(see step 610 in Fig.6, Receive a First ATM cell (a current remnant packet); wherein an ATM

cell has a header field and a payload field, hence, the remnant routing information in the

address field and remnant data information in the data field); and

building a reconstructed data packet characterized by the fixed-length packet format by:

identifying original data packet routing information contained in the data field of the current

remnant packet *(see Fig.2: a portion of header 122 of packet 120 (reconstructed data packet) is*

extracted from the payload 146 (the current remnant data field) of the packet 140 (remnant

packet); note that a reconstructed data packet is considered as an encapsulated data packet that

has been decapsulated); and

Woodward failed to explicitly disclose inserting the original data packet routing

information in the address field of the reconstructed data packet. **However, Woodward clearly**

disclosed encapsulating for packets as shown in Fig.2, wherein a portion of header 122 of packet

120 *(the original data packet)* was inserted into the payload 146 *(the current remnant data field)*

of the packet 140 *(remnant packet)* and this original data packet routing information of the

original data packet 120 was encapsulated with other portions of other original packets 100 and

120 in the packet 140. **Therefore, it is inherently Woodward disclosed** the instant subject

matter of this claim because at a receiver of a destination node, when it receives this

encapsulated packet, this packet should be decapsulated, thus, the original data packet routing

information should be inserted back into the address field of a reconstructed data packet, wherein

the reconstructed data packet is considered as an decapsulated packet at the receiver of the

destination node for getting an appropriate original packet sent from a source node.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to

combine such inserting the original data packet routing information in the address field of the

reconstructed data packet teaching in the instant claim with Woodward, in order to appropriate

packets to a destination node in a communications network. The motivation for doing so would

have been to provide enhanced services of Woodward in both ATM and broadband networks.

Therefore, it would have been obvious to combine the instant claim and Woodward the invention

as specified in this claim.

c) **In Regarding to Claim 16: Woodward disclosed** all aspects of this claim as set forth

in the claim 9, and Woodward further disclosed the method, wherein:

receiving a remnant packet comprises receiving a remnant ATM cell *(see step 610 in*

Fig.6); and

constructing a reconstructed data packet comprises:

constructing a reconstructed ATM cell *(see packet 120 in Fig.2)*.

Woodward failed to explicitly disclose retrieving a VCI from the data field of the

remnant ATM cell; and inserting the VCI in the VCI field of the reconstructed ATM cell.

However, accordingly in the claimed subject matters of Claim 6 as described above, the

claimed subject matters for retrieving a VCI from the data field of the remnant ATM cell; and

inserting the VCI in the VCI field of the reconstructed ATM cell are the inverse steps of as

described in claim 6, and such inverse steps using for decapsulating ATM packets *(constructed*

packets) from an ATM encapsulated packet *(remnant packet)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such retrieving a VCI from the data field of the remnant ATM cell; and inserting the VCI in the VCI field of the reconstructed ATM cell teaching in the instant claim with Woodward, in order to provide appropriate packets to a destination node in a communications network. The motivation for doing so would have been to provide enhanced services of Woodward in both ATM and broadband networks. Therefore, it would have been obvious to combine the instant claim and Woodward the invention as specified in this claim.

d) **In Regarding to Claim 23: Woodward disclosed** a communication network node comprising:

a receiver for receiving a remnant packet characterized by a fixed-length packet format defining a remnant address field and a remnant data field, the remnant address field comprising remnant packet routing information *(see Fig. 4 block 410: ATM cell receiver; see Fig.1: packet 30 (remnant packet))* and the remnant data field comprising original data packet routing information and original data packet data information *(see Fig.1: payload 36 (the remnant data field) of packet 30 (remnant packet) having both ATM header 12 and ATM payload 14 of the original packet 10)*; and

a processor *(see Fig.4: block 438 (processor)* operable to form a reconstructed data packet characterized by the fixed-length packet format including a reconstructed address field and a reconstructed data field.

Woodward failed to explicitly disclose a reconstructed data packet characterized by the fixed-length packet format including a reconstructed address field and a reconstructed data field,

the reconstructed address field comprising original packet routing information from the remnant

data field.

However, Woodward inherently disclosed such a reconstructed data packet

characterized by the fixed-length packet format including a reconstructed address field and a

reconstructed data field *because it is shown in Fig.3 that packet 200 (considered as a*

reconstructed packet when a remnant packet is decapsulated to its original packets; it means

that the packet 240 is reconstructed back to the packets 200 and 210 – the reverse steps of

original packets to a remnant packet), header 202 (reconstructed address field) and payload 204

(reconstructed data field)), and the reconstructed address field comprising original packet

routing information from the remnant data field *(see Fig.1: wherein the header 12 of the original*

packet 10 should be inserted to the payload 36 (remnant data field) of the packet 30 (remnant

packet).

At the time of the invention, it would be obvious to a person of ordinary skill in the art to

combine such a reconstructed data packet characterized by the fixed-length packet format

including a reconstructed address field and a reconstructed data field, the reconstructed address

field comprising original packet routing information from the remnant data field teaching in the

instant claim with Woodward, in order to provide appropriate packets to a destination node in a

communications network. The motivation for doing so would have been to provide enhanced

services of Woodward in both ATM and broadband networks. Therefore, it would have been

obvious to combine the instant claim and Woodward the invention as specified in this claim.

f) **In Regarding to Claim 24: Woodward further disclosed** the communication

network node of claim 23, wherein the reconstructed data field comprises at least a portion of the

original data packet data information *(see Fig.2: 204 and 246; it is inherently as described in claim 23, wherein the data routing information and data information from the payload 246 are moved back to its original packets)*.

g) **In Regarding to Claim 25: Woodward further disclosed** communication network node of claim 23, wherein the processor is further operable to insert stored data information from a prior associated remnant packet in the reconstructed data field *(see Fig.1: packet 20 (a prior original packet) and packet 10 (the original packet); wherein the payload 24 (at least a portion of data field) of the prior original packet 20 has been inserted (stored) in the payload 36 of the packet 30 (the reconstructed packet))*.

h) **In Regarding to Claim 26: Woodward further disclosed** the communication network node of claim 23, wherein said receiver receives a subsequent remnant packet including a subsequent data field *(see packet 150 in Fig.2)*, and said processor forms a subsequent reconstructed data packet according to the fixed-length packet format *(see Fig.2 packet 120)*, including a subsequent reconstructed data field *(see Fig.2 payload 124)* comprising original data packet data information from the remnant packet *(see Fig.1: wherein payload 14 of packet 10 (original packet) was inserted to packet 30 (remnant packet)*

Woodward failed to explicitly disclose a subsequent reconstructed data field comprising at least a portion of the subsequent data field.

However, Woodward inherently disclosed such a subsequent reconstructed data field comprising at least a portion of the subsequent data field because it is as shown in Fig.1: *wherein the payload 24 of the original subsequent packet was inserted to the payload 36 of packet 30 (remnant packet). Thus, it is inherently Woodward disclosed this subject matter of the instant*

claim because when a remnant packet is decapsulated to be a reconstructed packet is one of inverse steps of constructing the remnant packet, hence, the subsequent reconstructed data field comprising at least a portion of the subsequent data field.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such a subsequent reconstructed data field comprising at least a portion of the subsequent data field teaching in the instant claim with Woodward, in order to provide appropriate packets to a destination node in a communications network. The motivation for doing so would have been to provide enhanced services of Woodward in both ATM and broadband networks. Therefore, it would have been obvious to combine the instant claim and Woodward the invention as specified in this claim.

i) **In Regarding to Claim 28: Woodward disclosed** all aspects of this claim as set forth in the claim 23.

Woodward failed to explicitly disclose wherein said remnant packet is an ATM cell, and said reconstructed data packet is an ATM cell comprising a VCI field including VCI information from the remnant data field. However, these claimed subject matters are the same as that in the claim 16 above. Therefore, the rejection in claim 16 would be applied to the rejection in this claim.

11. **Claims 2-5, 10-12** and **18 are** rejected under 35 U.S.C. 103(a) as being unpatentable over **Woodward** (US Patent No. **6,151,318**) in view of **Braff et al.** (US Patent No. **5,166,930**), hereinafter referred to as Braff.

a) **In Regarding to Claim 2: Woodward disclosed** all aspects of this claim as set forth in the claim 1:

Woodward failed to explicitly disclose wherein constructing a first remnant packet further comprises: inserting a first portion of the original data packet data information in the remnant packet data field.

Braff disclosed such inserting a first portion of the original data packet data information in the remnant packet data field *(see Fig.3: wherein the first portion of data information of the message 305 is inserted to the payload 303 of the TS1 (wherein the TS1 consisting of the header 302, payload 303 and the trailer 304; therefore, it is considered as a remnant packet) before transmission).*

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such inserting a first portion of the original data packet data information in the remnant packet data field, as taught by Braff with Woodward, in a purpose of identifying appropriate information in encapsulated packets. The motivation for doing so would have been to provide enhanced services of Woodward in both ATM and broadband networks. Therefore, it would have been obvious to combine Braff and Woodward the invention as specified in this claim.

b) **In Regarding to Claim 3: Woodward further disclosed** the method of claim 2, further comprising:

when the original data packet and a prior original data packet form part of a common message, inserting at least a portion of a prior original data packet data field in the remnant packet data field *(see Fig.1: packets 20 (a prior original packet) and packet 10 (the original*

packet); wherein the payload 24 (at least a portion of data field) of the prior original packet 20

has been inserted into the payload 36 of the packet 30 (the remnant packet)).

     c) **In Regarding to Claim 4: Woodward disclosed** all aspects of this claim as set forth

in the claim 1:

     Woodward failed to explicitly disclose the method further comprising constructing a

subsequent remnant packet characterized by the fixed-length packet format by inserting a second

portion of first data information in the data field of the subsequent remnant packet.

     Braff disclosed such constructing a subsequent remnant packet characterized by the

fixed-length packet format by inserting a second portion of first data information in the data field

of the subsequent remnant packet *(see Fig.3: wherein TS2 (considered as a subsequent remnant*

packet) contains a second portion of first data information in the payload of the TS2).

     At the time of the invention, it would be obvious to a person of ordinary skill in the art to

combine such a subsequent remnant packet characterized by the fixed-length packet format by

inserting a second portion of first data information in the data field of the subsequent remnant

packet, as taught by Braff with Woodward, in a purpose of identifying appropriate information in

encapsulated packets. The motivation for doing so would have been to provide enhanced services

of Woodward in both ATM and broadband networks. Therefore, it would have been obvious to

combine Braff and Woodward the invention as specified in this claim.

     d) **In Regarding to Claim 5: Woodward further disclosed** the method of claim 4,

further comprising:

     receiving a subsequent original data packet characterized by the fixed-length packet

format, the subsequent original data packet carrying subsequent original data packet routing

information in the address field *(see Fig.6 step 610; and Fig.2: packet 120 (subsequent original data packet))*; and

inserting at least a portion of the subsequent original packet routing information in the data field of the subsequent remnant packet *(see Fig.2: wherein a portion of header 122 of the packet 120 was inserted into the packet 150 (the subsequent remnant packet).*

e) **In Regarding to Claim 10: Woodward disclosed** all aspects of this claim as set forth in the claim 9, and **Woodward further disclosed** identifying original data packet data information contained in the data field of the current remnant packet *(see Fig.2: a portion of header 122 of packet 120 (reconstructed data packet) is extracted from the payload 146 (the current remnant data field) of the packet 140 (remnant packet); note that a reconstructed data packet is considered as an encapsulated data packet that has been decapsulated).*

Woodward failed to explicitly disclose wherein building a reconstructed data packet further comprising inserting at least a first portion of the original data packet data information in the data field of the reconstructed data packet.

Braff disclosed such inserting at least a first portion of the original data packet data information in the data field of the reconstructed data packet *(see Fig.3: wherein the first portion of data information of the message 305 is inserted to the payload 303 of the TS1 (wherein the TS1 consisting of the header 302, payload 303 and the trailer 304; therefore, it is considered as a reconstructed packet)).*

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such inserting at least a first portion of the original data packet data information in the data field of the reconstructed data packet, as taught by Braff with Woodward, in a purpose of

identifying appropriate information in encapsulated packets. The motivation for doing so would

have been to provide enhanced services of Woodward in both ATM and broadband networks.

Therefore, it would have been obvious to combine Braff and Woodward the invention as

specified in this claim.

f) **In Regarding to Claim 11: Woodward further disclosed** the method of claim 10,

further comprising storing at least a portion of original data packet data information from a prior

remnant packet in the data field of the reconstructed data packet *(see Fig.1: packet 20 (a prior*

original packet) and packet 10 (the original packet); wherein the payload 24 (at least a portion

of data field) of the prior original packet 20 has been inserted (stored) in the payload 36 of the

packet 30 (the reconstructed packet)).

g) **In Regarding to Claim 12: Woodward further disclosed** the method of claim 9,

wherein building a reconstructed data packet further comprises: when the current remnant packet

and a prior remnant packet form part of a common message *(see Fig.2: packet 100 (current*

remnant packet) and packet 110 (a prior remnant packet) and packet 140 (a common message)).

Woodward failed to explicitly disclose storing at least a portion of prior remnant packet

data information in the data field of the reconstructed data packet.

Braff disclosed such storing at least a portion of prior remnant packet data information in

the data field of the reconstructed data packet *(see col.1 line 67 – col.1 line 3)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to

combine such storing at least a portion of prior remnant packet data information in the data field

of the reconstructed data packet, as taught by Braff with Woodward, in a purpose of receiving

and forwarding packets throughout an ATM network. The motivation for doing so would have

been to provide enhanced services of Woodward in both ATM and broadband networks.

Therefore, it would have been obvious to combine Braff and Woodward the invention as

specified in this claim.

h) **In Regarding to Claim 18: Woodward disclosed** all aspects of this claim as set forth

in the claim 17, and **Woodward further disclosed** a memory coupled to the processor for

storing a second portion of the original data field *(see Fig.4 buffer 434).*

Woodward failed to explicitly disclose wherein the remnant data field further includes a

first portion of the original data field.

Braff disclosed such remnant data field further includes a first portion of the original

data field *(see Fig.3: wherein the first portion of data information of the message 305 is inserted*

to the payload 303 of the TS1 (wherein the TS1 consisting of the header 302, payload 303 and

the trailer 304; therefore, it is considered as a reconstructed packet)).

At the time of the invention, it would be obvious to a person of ordinary skill in the art to

combine such remnant data field further includes a first portion of the original data field, as

taught by Braff with Woodward, in a purpose of identifying appropriate information in

encapsulated packets. The motivation for doing so would have been to provide enhanced services

of Woodward in both ATM and broadband networks. Therefore, it would have been obvious to

combine Braff and Woodward the invention as specified in this claim.

12. **Claims 7, 15, 20, 21 and 27 are** rejected under 35 U.S.C. 103(a) as being unpatentable over

Woodward (US Patent No. **6,151,318**) in view of **Opalka et al.** (US Patent No. **6,259,699**),

hereinafter referred to as Opalka.

a) **In Regarding to Claim 7: Woodward disclosed** all aspects of this claim as set forth in the claim 1, **except for** when the address field of the original data packet includes sufficient available space for subsequent routing in an intermediate network, sending the original data packet without constructing.

Opalka disclosed when the address field of the original data packet includes sufficient available space for subsequent routing in an intermediate network, sending the original data packet without constructing *(see abstract and Fig.4)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such when the address field of the original data packet includes sufficient available space for subsequent routing in an intermediate network, sending the original data packet without constructing, as taught by Opalka with Woodward, in a purpose of switching ATM packets without transforming the original packet protocol. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine Opalka and Woodward the invention as specified in this claim.

b) **In Regarding to Claim 15: Woodward disclosed** all aspects of this claim as set forth in the claim 9, and **Woodward further disclosed** receive a data packet *(see Fig.6 step 610)*; and determining if the data packet is a remnant packet *(see Fig.6: step 630)*.

Woodward did not clearly disclose when the data packet is not a remnant packet, sending the data packet without building a reconstructed data packet.

Opalka disclosed when the data packet is not a remnant packet, sending the data packet without building a reconstructed data packet *(see abstract and Fig.4)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such when the data packet is not a remnant packet, as taught by Opalka with Woodward, in a purpose of switching ATM packets without transforming the original packet protocol. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine Opalka and Woodward the invention as specified in this claim.

c) **In Regarding to Claim 20: Woodward disclosed** all aspects of this claim as set forth in the claim 17, **except for** wherein said fixed-length packet format is ATM, and the remnant data field comprises at least a portion of a VCI from the original data packet.

Woodward did not clearly disclose the remnant data field comprises at least a portion of a VCI from the original data packet. **However,** accordingly in Fig.2, there is a portion of header 122 of the ATM packet 120 *(the original ATM packet)* is inserted in the data field of the packet 140 *(remnant packet);* it is possible that this inserted portion can be a VCI because the VCI a component of an ATM header.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such inserting the VCI from the original ATM cell in the data field of the remnant packet teaching in the instant claim with Woodward, in a purpose of identifying one of logical connections multiplexed on one logical path that is communicated between switching stations. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine the instant claim and Woodward the invention as specified in this claim.

Opalka disclosed wherein said fixed-length packet format is ATM *(see abstract, Fig.4 and col.2 lines 22-29)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such fixed-length packet format is ATM, as taught by Opalka with Woodward, in a purpose of switching ATM packets without transforming the original packet protocol. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine Opalka and Woodward the invention as specified in this claim.

d) **In Regarding to Claim 21: Woodward disclosed** all aspects of this claim as set forth in the claim 17, **except for** wherein the processor is operable to send the original data packet without first constructing a remnant packet when the original address field includes sufficient available space for subsequent routing in an intermediate network.

Opalka disclosed wherein the processor is operable to send the original data packet without first constructing a remnant packet when the original address field includes sufficient available space for subsequent routing in an intermediate network *(see abstract and Fig.4)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such a processor is operable to send the original data packet without first constructing a remnant packet when the original address field includes sufficient available space for subsequent routing in an intermediate network, as taught by Opalka with Woodward, in a purpose of switching ATM packets without transforming the original packet protocol. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine Opalka and Woodward the invention as specified in this claim.

e) **In Regarding to Claim 27:** **Woodward disclosed** all aspects of this claim as set forth in the claim 23, **except for** wherein the processor is further operable to send the received data packet without constructing a reconstruction data packet when the received data packet is not a remnant packet.

Opalka disclosed the processor is further operable to send the received data packet without constructing a reconstruction data packet when the received data packet is not a remnant packet *(see abstract and Fig.4)*.

At the time of the invention, it would be obvious to a person of ordinary skill in the art to combine such a processor is further operable to send the received data packet without constructing a reconstruction data packet when the received data packet is not a remnant packet, as taught by Opalka with Woodward, in a purpose of switching ATM packets without transforming the original packet protocol. The motivation for doing so would have been to route packets faster. Therefore, it would have been obvious to combine Opalka and Woodward the invention as specified in this claim.

Allowable Subject Matter

13. **Claims 13 and 14** are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Examiner Information

14. Any inquiry concerning this communication or earlier communications from the examiner

should be directed to Anthony T Ton whose telephone number is 703-305-8956. The examiner

can normally be reached on M-F: 8:00 am - 4:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Douglas W Olms can be reached on 703-305-4703. The fax phone number for the

organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent

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system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

ATT
6/16/04

Phirin Sam